

TASMANIAN FIELD NATURALISTS CLUB INC.

established 1904

BULLETIN

<http://www.tasfieldnats.org.au>

Editor : Don Hird (email dgh52@westnet.com.au)

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The Tasmanian Field Naturalists Club encourages the study of natural history and supports conservation. We issue our journal *The Tasmanian Naturalist* annually in October. People of any age and background are welcome as members.

Phone Janet Fenton (03 6239 6443) for further information, or write to GPO Box 68, Hobart, 7001.

Programme

General Meetings start at 7.45 pm on the first Thursday of the month, in the Life Science Building at the University of Tasmania. Outings are usually held the following weekend, meeting outside the Tasmanian Museum and Art Gallery entrance in Macquarie Street. Bring lunch and all-weather outdoor gear.

If you are planning to attend an outing but have not been to the prior meeting, please check details. Phone Janet Fenton 03 6239 6443 or email Don Hird. Unforeseen changes sometimes occur.

Thu 1 Feb.	Meeting 7.45pm in Life Sciences building, University of Tas. Our guest speaker (to be confirmed) will be Prof. Jamie Kirkpatrick speaking about <i>Tasmanian Grasslands</i> .
Feb 2-4 weekend excursion.	We will revisit Arthur Clarke's Francistown property near Dover. Caving will be a major theme but there is much natural history to be explored in the local area. Bring a sleeping bag, therma-rest, torch, food etc if staying over for caving (to see glow-worms, cave spiders, cave formations etc.) on the Sunday. Arthur has some floor space, but some may like to bring their own tent if you plan to stay overnight. For caving please bring gumboots or sturdy walking boots that can cope with getting wet, old clothes, pref overalls, torch, or even better, helmet with mounted light. More details at the February meeting or contact Arthur arthurc@southcom.com.au .

Thu 1 Mar	7.45p.m.: AGM. Committee positions will be open for election and reports on the Club's activities in the last year will be presented. Janet Fenton will provide the Presidential Address.
Sat 3 Mar Excursion	Depart Museum at 9:00 a.m. Subject to confirmation we will visit an area recently appended to the Chauncey Vale Reserve in the southern midlands.
Thu 5 Apr	Meeting 7.45pm in Life Sciences building, University of Tas. Mike Driessen will address the theme <i>Things That Hop and Sing</i> .
Easter Camp Apr. 6-9	Possible venues at this stage include Southport or Bruny Island. Stay tuned for details.

South Lea Excursion

9 December 2006, report by Adrian Brettingham-Moore

On a fine hot December the group met on the property of John Walch, "South Lea", and he kindly led us thru his 'dry sclerophyll' back ridge, and joined us afterwards at the end of year barbecue in his historic garden –refurbished on Colonel Fitzroys landscaping for Proctor House burnt in 1967 bushfires. 16 members attended.

Three juvenile blue wrens in a brier rose bush in the car parking paddock were too lively for the delays of a digital camera, so onward to catch up with the push at a 'Physics Department Field Installation' which used two radio towers to monitor the height of the ionising layer, the steep gully sides giving useful screening from ground based noise. The installation was done in the '70's but is now run from the Uni of Tas. A close by concrete block structure housed a magnetometer that is remotely run from Japan.

A grasshopper caught there was identified as *Tasmaniaris tasmaniensis*, the "tasmanian grasshopper; moving up the valley we crossed the Kingston water pipeline. The tracks were largely pushed in to facilitate firewood extraction for Jones Jam Factory, but are now used as equestrian trails. The dominant stringy barks were still showing charring from a 1998 fire. A huntsman spider was recorded.

When we paused mid way to look keenly at two rough stick nests in the gums a grey fantail and a satin fly catcher gave impromptu entertainment. Shortly after we side tracked to the crest of Peppermint Ridge where the dry old bones of a frog were found under a log, and some Kelp Gulls screeched overhead. Under another log at the turning point some plant roots appeared to have been induced by ants nesting there to have developed 'corms' tho the connection was surmised not proved. John Walch reminisced on climbing Frenchmans Cap by Shackelton's photographer (Frank?/John?) Hurley with

glass plate negatives and heavy tripods. We returned to our starting point down the ridgeline. A Grey Goshawk and a Shining Bronze Cuckoo were also reported.

John Walch gave an outline of the history of the property before we settled to a pleasant bbq picnic.

The snail list:

Snails (especially *Planilaoma luckmanii*, which is very drought-tolerant) were reasonably common despite the very dry conditions.

Caryodes dufresnii, *Tasmaphena ruga*, *Paralaoma caputspimulae*, *P. halli*, *P. mucoides*, *Trocholaoma parvissima*, *Planilaoma luckmanii*, *Elsothera ricei*, *Allocharopa* sp. "Christ College".

The last listed is an uncommon undescribed species known from nine or ten records, mostly around greater Hobart plus one record from Chauncy Vale and a dubious record from Cradoc. Kevin Bonham

Bird List:

Brown goshawk
Grey goshawk
Kelp gull
Yellow tailed black cockatoo
Superb fairy wren
Sulphur crested cockatoo
Fantailed cuckoo
Shining bronze cuckoo
Grey shrike thrush
Satin flycatcher
Grey fantail
Striated pardelote
Robin (heard not to species)
Firetail (heard not confirmed)
Green rosella

Plant list:

F=flowering; JFF just finished F; S seed

Bull oak *Allocasuarina littoralis*
Goodenia ovata F
Wallaby grass -*Danthonia* sp
Cranberry heath *Astroloma humifusum*
Rush *Lomandra longifolia* F
Prickly Moses *Acacia verticillata*
Silver Wattle *Acacia dealbata*
Bedfordia salicina JPF
Native Cherry *Exocarpos cupressiformis*
Dolly bush *Cassinia aculeatae* F
Correa reflexa

Prickly box *Bursaria spinosa*
Woolly Tea-tree *Leptospermum lanigerum*

-Magnetometer/Tower

Peppermint eucalypt
Blue Gum *Eucalyptus globulus*
Buzzy *Acaena novae-zelandiae*
Pomaderris elliptica (buds)
Grasshopper
Hawksbit F (not native)
Pimelia nivea F
Haloragis sp F
Native Currant *Coprosma nitida*
Cutting grass *Gahnia grandis* F
Dodonea viscosa
Like Dolly Bush *Ozothamnus* sp F
Pultenea juniperina JFF
Banksia marginata
Allocasuarina sp (not as above)
Lomatia tinctoria F
Veronica formosa/derwentia ? F
Bracken *Pteridium esculentum*
Blackwood *Acacia melanoxylon*
Fireweed *Senecio linearifolius*
Clematis aristata JFF
Dianella tasmanica F
Pultenea daphnoides JFF
Leptomeria sp
Native Olive *Notelaea lingustrina*
Eucalyptus obliqua on S facing bank

-Up hill

Epacris impressa
Juncus sp
Acacia mucronata
Philothea (Eriostemon) verrucosus F
Acacia axillaris
Tetratheca?
Acacia myrtifolia
Hovea linearis
Cassytha

-On top & down

Centaurea sp F
Linum marginale F
Leptospermum scoparia
Linum sp. F
Yellow buttons *Leptorhynchus squamatus*?
Olearia with very small leaves – *O. phlogopappa*? F
Yellow bulb lily *Bulbine bulbosa* F

Lissanthe stringosa F
Leucopogon sp F
Eucalyptus pulchella F
E. viminalis
Black wattle *A. mearnsii* F

-Old Proctors Road

Beyeria above rockery ?

Excursion to the Tasmanian Seed Conservation Centre

5 Nov 2006, report by Mary King & Janet Fenton

Fourteen of us gathered expectantly at the gate of the Royal Tasmanian Botanical Gardens where we were met by James Wood, who ushered us to the laboratory facility where the 'seed bank' project is all happening. After hearing Leslie Kirby's talk on Thursday night about the RTBG past and present we were keen to see 'behind the scenes'.

The Tasmanian Seed Conservation Centre, which opened in August 2005, aims to provide a source of high quality genetic material as a form of insurance against extinction of our unique flora. It is part of a collaborative project, coordinated by the Kew Gardens Millennium Seed Bank Project, a 10 year international seed conservation program which aims to collect and conserve the seed of 24,000 of the world's species. James pointed out that seed storage is only one part of insurance - plants need the environment to go back into! In Tasmania, the Resource Management and Conservation Unit of DPIW and the Herbarium (TMAG) are in partnership with the Royal Tasmanian Botanical Gardens. Other Australian states have similar arrangements with Kew. James Wood was working on the project in Kew before he moved here to work on the Tasmanian branch of the program.

James crammed us all into the laboratory where he showed us a Zig-zag Aspirator which cleaned the seed - 'winnowing with knobs' James called it! Once cleaned, seeds are held in the drying room at 15% humidity and 15 degrees C. Once dried, the seed is packaged and refrigerated at -20 degrees C and duplicate material is dispatched to Kew for storage in the Millennium Seed Bank. After that James carries out germination tests to ensure that seed is viable, and also to provide information about germination requirements of different species, as very little seems to be known in this area! Germination is a complex field, all sorts of factors such as low percentage of viable seed, differing dormancy periods, and physical or chemical triggers that break dormancy (eg. scarification, smoke), have to be taken into account.

The target is to collect seed from 800 species over a five year period. The project is well underway with about 210 seed collections having been made to date. Herbarium specimens are part of the project so that the precise plant relating to the seed collected can be verified. Field collecting, using strict criteria, is mainly the role of the DPIW partner. Field naturalists like ourselves can be useful in alerting staff on the project to potential sources of seed. With this in mind we have included on our website a list supplied by James, of target plants required as sources of viable seed.

James had almost got rid of us when we started discussing chemical compounds secreted by the roots of some plants, that have the effect of attracting or repelling others. In trials,

Cuscata had shown a marked tendency to grow towards tomatoes. James beetled off to the nursery with a long line of field nats following after him, to show us *Cuscata* seedlings (weird little orange curly things straight out of science fiction) parasitising *Dichondra* sp.

Many thanks James for a most informative morning!

Rocks, Soils, Plants - Wildflower Spectacular

6th - 8th October, City Hall, Hobart - report by Janet Fenton

The Australian Plants Society's 2006 show theme, "*What Grows Where and Why*", raised questions and gave answers in varied displays. The main theme was displayed in the centre of the hall and showed the mud-stone, sandstone and dolerite geology around Hobart, the soils derived from these rocks and the flora they support. TAFE students were there in-force for two days before the show shoveling mountains of sand to build their magnificent coastal display. Other exhibitors included local native-plant nurseries, the university's Plant Science, and the Herbarium. The whole hall smelled gorgeous with foliage and was alive with colour, while bird calls emanating from the TFNC corner added to the bushland ambience. The Hobart City Council's display offered a weed identification challenge, while wonderful creatures made from banksia cones and other seed structures emerged from the children's corner.

Blending into the children's corner was our TFNC display, the microscopes drawing exclamations such as "Yuk!" (to slaters); "Mummy, look, look, its alive!"; "I can see!!!"; "Its a fairy wonderland" (lichens, mosses and fungi). As expected, adults needed more persuading to look down the microscopes than did the children.

Our display featured a rotting log, and also rocks, which children enjoyed lifting to see pictures of the animals that live underneath. Papier-maché rocks that were hollow underneath could be lifted up to reveal invertebrates in glass jars, alive and well. A giant model of an earthworm with a cutaway section showing the internal organs was a feature of interest, - thanks to the University's zoology department. Spiders in resin and a Blotched Bluetongue courtesy of the TMAG loan collection, and interesting posters about fungi and soils added to our display.

Young Jake, who we met at the 2004 flower show, spent many hours at our microscopes again this year. Wonderful to see so many enthusiastic kids.

Our display took two days to install, but only one hour to dismantle on Sunday afternoon! Many thanks to all those who helped to put it together (and pull it apart again) and to those volunteers who spent time behind the counter answering questions and encouraging the public to get involved with some natural history.

Dust Off Those Notebooks – A Call For Help

- Dr Lynda Chambers, Bureau of Meteorology Research Centre

In the northern hemisphere there are many studies linking the already observed warming temperatures to changes in the environment, such as flowering and fruiting occurring earlier, changes in mating behaviour and animals breeding earlier.

So what is happening in Australia? We don't have much information, although, with the help of naturalists we have already discovered that a number of Western Australian birds have changed the timing of their migration and that plants in the greater Melbourne region have altered when they flower – but the Australian picture is sparse and *we need your help*.

However, as many of our species only occur in Australia what is happening in the northern hemisphere might not apply to our flora and fauna. This makes it critical to determine the impact of climate change on the Australian environment to enable us to better manage it into the future.

The greatest hurdle to achieving this is knowing what information has already been collected and then how to get access to it. This led to the development of the National Ecological Meta Database, a project run by the Bureau of Meteorology, the University of Melbourne, Macquarie University and the Australian Greenhouse Office. This database is located at <http://www.bom.gov.au/nemd/> and access is available to anyone free of charge.

We need people who have been recording information, such as breeding records, daily or weekly presence/absence, flowering dates, bird arrival dates, etc., to list their records on this website. The website will only collect information about your records and how to obtain access to them; the records remain in your custody, giving you final say in who and for what purpose they can be used. The website can also be used to search for other organisations or individuals that may have records of interest to you.

If you want to know more about the project or have any questions please visit our website <http://www.bom.gov.au/nemd/> or contact Dr Lynda Chambers at the Bureau of Meteorology Research Centre.

Dr Lynda Chambers
Bureau of Meteorology Research Centre, GPO Box 1289, Melbourne, Vic 3111
(03) 9669 4784 nemd@bom.gov.au

Vale Gretna Weste (1917-2006)

by Janet Fenton

TFNC members were saddened to hear of the death in August of club member Gretna Weste.

Gretna grew up and studied in Melbourne then worked as a research officer in the Forest Commission. In the late 1930s and early 1940s few women worked in research positions and her position description was "temporary typist"! After raising her family, Gretna went back to Melbourne University as a lecturer in Botany, working on her PhD, her subject being a root rot fungus in wheat. In 1970 her research shifted to the plant pathogen *Phytophthora cinnamomi*, the cinnamon root rot fungus that was devastating Australian native plant communities. Gretna worked her way up from lecturer to reader to coordinator of the Botany department and in her research area made quite a contribution to the phytopathology community in Australia and overseas. She was granted a DSc by publications in 1983, the year she retired. In that year she was the organising chairman of the Fourth International Plant Pathology Congress, and also organised a *Phytophthora* workshop at the University of Melbourne.

Not one to slow down after retirement, Gretna kept up the research. She was asked to do a survey of the threat of the cinnamon fungus to the endemic floras right through each state of Australia. She was awarded a Medal of the Order of Australia in 1989. Gretna was a foundation member of the Australasian Plant Pathology Society and was made patron of the Australasian Mycological Society.

In her retirement Gretna moved to Kingston Beach in Tasmania and joined the TFNC.

Tasmanian Field Naturalists Club Inc. - G.P.O. Box 68, Hobart, Tas. 7001
Annual General Meeting & Election of Office Bearers

The 2007 AGM; Thursday 1 March in the Life Sciences Lecture Theatre, Uni of Tas.
 The president's talk will be at 7:45pm, followed by the AGM, then a General Meeting.

Nominations are called for the election of office bearers as listed below.

Nominations, on the attached slips, should reach the Secretary at the above address by Mon 26 Feb, or be delivered in person at the 1 Feb General Meeting, or immediately prior to the start of the AGM on 1 Mar.

Positions for Election

**PRESIDENT; VICE PRESIDENT; SECRETARY; TREASURER; BULLETIN EDITOR;
 WALKS & TALKS; NATURALIST EDITOR; LIBRARIAN; COMMITTEE member.**

<p style="text-align: center; font-size: small;">Tasmanian Field Naturalists Club, 2007</p> <p>Nomination for position of:</p> <p>_____</p> <p>_____</p>	<p>Nominated by:</p> <p>Seconded by:</p> <p>Accepted *:</p>
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* Signature of acceptance by the person being nominated. If this is left blank, the person will be asked at the AGM if they accept nomination.